

**Table S1.** Pearson correlation of chemical and rheological data.

		Water absorption [%]	Dough development time [min]	Dough stability [min]	Dough softening [BU]	Energy [cm <sup>2</sup> ]	Dough resistance [BU]	Extensibility [mm]	Ratio number
<b>Ash</b>	<i>r</i>	0.9235	0.5038	0.7301	0.5277	- 0.7474	-0.5656	-0.1249	-0.5051
	<i>p</i>	0.0251	0.3868	0.1614	0.3607	0.1465	0.3204	0.8414	0.3854
<b>Protein</b>	<i>r</i>	0.8959	0.3408	0.6217	0.3489	- 0.7242	-0.5831	-0.1836	-0.5167
	<i>p</i>	0.0397	0.5747	0.2628	0.5649	0.1665	0.3021	0.7675	0.3727
<b>Fat</b>	<i>r</i>	0.4844	-0.2751	-0.0271	0.7096	- 0.0544	0.1832	-0.8098	0.2654
	<i>p</i>	0.4083	0.6542	0.9655	0.1794	0.9308	0.768	0.0967	0.6661
<b>Starch</b>	<i>r</i>	-0.5213	0.0932	0.0277	0.0154	0.1765	0.0123	0.7321	-0.0723
	<i>p</i>	0.3677	0.8815	0.9647	0.9804	0.7764	0.9844	0.1596	0.908
<b>Dietary fiber</b>	<i>r</i>	-0.0421	-0.0801	-0.167	-0.8331	- 0.0395	-0.1576	-0.0065	-0.1505
	<i>p</i>	0.9464	0.8981	0.7883	0.0798	0.9498	0.8002	0.9917	0.8091

**Table S2.** Physical baking properties (Specific volume, volume yield, texture, baking loss) of the SWB including alternative cereal (red sorghum, white sorghum, millet, amaranth, buckwheat).

Addition [%]		0	5	10	15	20	25	30	35	40
Red sorghum	Specific volume [ml/g]	2.59±0.24f	2.33±0.06de	2.41±0.05e	2.31±0.05cd	2.34±0.04de	2.21±0.11b	2.24±0.13bc	2.06±0.14a	2.12±0.07a
	Parameter compared to control [%]	100±9	90±3	90±2	89±2	90±2	85±5	86±6	80±7	82±3
White sorghum	Specific volume [ml/g]	2.41±0.11e	2.36±0.18de	2.35±0.17de	2.4±0.11e	2.34±0.13de	2.28±0.11cd	2.25±0.14bc	2.19±0.08b	2.1±0.09a
	Parameter compared to control [%]	100±5	98±8	98±7	100±5	97±6	95±5	93±6	91±4	87±4
Millet	Specific volume [ml/g]	2.75±0.25e	2.63±0.23de	2.5±0.22cd	2.5±0.25cd	2.46±0.19bc	2.34±0.12ab	2.32±0.18a	2.25±0.16a	2.23±0.26a
	Parameter compared to control [%]	100±9	95.64±9	90.91±9	90.91±10	89.45±8	85.09±5	84.36±8	81.82±7	81.09±12
Amaranth	Specific volume [ml/g]	2.69±0.11e	2.54±0.16d	2.57±0.08d	2.49±0.12cd	2.41±0.11c	2.19±0.14b	1.91±0.08a	1.9±0.11a	1.81±0.08a
	Parameter compared to control [%]	100±4	94.42±6	95.54±3	92.57±5	89.59±5	81.41±6	71±4	70.63±6	67.29±4
Buckwheat	Specific volume [ml/g]	2.58±0.1h	2.45±0.1g	2.37±0.03c	2.37±0.14c	2.17±0.03e	2.1±0.04d	2.01±0.04c	1.91±0.07b	1.81±0.08a
	Parameter compared to control [%]	100±4	94.96±4	91.86±1	91.86±6	84.11±1	81.4±2	77.91±2	74.03±4	70.16±4
Red sorghum	Volume yield [ml/100g flour]	380.4±27.14f	347.36±9.12de	358.32±6.29e	344.96±5.79cd	347.6±6.27d	328.45±18.19b	335.55±18.77bc	308.56±21.02a	317.12±11.46a
	Parameter compared to control [%]	100±7	91±3	94±2	91±2	91±2	86±6	88±6	81±7	83±4
White sorghum	Volume yield [ml/100g flour]	361.08±16.16f	353.19±24.83ef	351.27±22.84def	356.5±18.16ef	347.81±17.7de	339.41±14.89cd	333.24±19.15bc	325.8±12.89b	313.33±14.23a
	Parameter compared to control [%]	100±4	98±7	97±7	99±5	96±5	94±4	92±6	90±4	87±5
Millet	Volume yield [ml/100g flour]	392.85±33.53d	375.95±30.97de	360.45±30.36bc	359.69±32.99bc	354.42±27.49b	336.28±15.51a	331.39±22.68a	323.6±18.68a	319.53±29.45a
	Parameter compared to control [%]	100±9	95.7±8	91.76±8	91.56±9	90.22±8	85.6±5	84.36±7	82.37±6	81.2±9
Amaranth	Volume yield [ml/100g flour]	392.85±33.53f	375.95±30.97ab	360.45±30.36e	359.69±32.99e	354.42±27.49d	336.28±15.51c	331.39±22.68b	323.6±18.68ab	319.53±29.45a
	Parameter compared to control [%]	100±3	95±4	95±3	92±4	88±5	81±7	71±4	71±5	67±4
Buckwheat	Volume yield [ml/100g flour]	380.41±14.42h	359.5±13.96g	350.86±5.51f	347.58±18.5f	319.62±4.16e	310.22±4.53d	296.71±4.61c	281.24±10.17b	263.81±8.7a
	Parameter compared to control [%]	100±4	95±4	92±2	91±5	84±1	82±1	78±2	74±4	69±3
Red sorghum	Crumb texture [N]	28.58±7.22a	33.48±3.62bc	32±2.49bc	32.07±3.6bc	30.36±3.91ab	33.76±7.4bc	34.33±6.92c	41.1±10.08d	38.51±7.71d
	Parameter compared to control [%]	100±25	117±11	112±8	112±11	106±13	118±22	120±20	144±26	135±20
White sorghum	Crumb texture [N]	36±3.13abc	37±5.25bc	36±4.86bc	33±3.93a	35±5.16ab	35±6.11ab	37±7.06bc	39±5.32c	43±7.32d
	Parameter compared to control [%]	100±9	103±14	102±13	92±12	98±15	98±18	105±19	108±14	120±17
Millet	Crumb texture [N]	26.77±4.77a	29.8±3.95ab	33.55±6.61bc	32.61±6.37bc	30.24±6.95ab	32.56±5.25bc	35.94±9.7cd	39.56±9.12d	45.17±16.04e
	Parameter compared to control [%]	100±18	111.32±13	125.33±20	121.82±20	112.96±23	121.63±16	134.25±27	147.78±23	168.73±36
Amaranth	Crumb texture [N]	22.96±3.46a	26.23±2.61c	24.85±2.93abc	23.48±3.1ab	25.78±6.27bc	30.29±3.82d	38.29±4.37e	39.68±7.03ef	41.41±5.21f
	Parameter compared to control [%]	100±15	114±10	108±12	102±13	112±24	132±13	167±11	173±18	180±13
Buckwheat	Crumb texture [N]	30.66±3.11a	35.68±3.8b	37.42±2.9b	41.86±5.63c	48.77±4.92d	54.91±4.76e	63.57±6.23f	72.95±7.22g	92.21±9.36h
	Parameter compared to control [%]	100±10	116±11	122±8	137±13	159±10	179±9	207±10	238±10	301±10
Red sorghum	Relative Elasticity [%]	54.75±1.69g	53.49±1.26f	52.85±1.25e	52.07±1.33d	51.79±0.84d	50.11±1.29bc	50.25±0.9c	49.6±0.91ab	49.35±0.89a
	Parameter compared to control [%]	100±3	98±2	97±2	95±3	95±2	92±3	92±2	91±2	90±2
White sorghum	Relative Elasticity [%]	54.18±1.12a	52.98±1.2b	51.97±1.27c	51.97±1.27c	51.15±0.72d	50.51±0.99f	50.5±0.79f	49.97±0.82fg	49.56±0.9g
	Parameter compared to control [%]	100±2	98±2	96±2	96±2	94±1	93±2	93±2	92±2	91±2
Millet	Relative Elasticity [%]	54.8±1.95f	53.16±1.57e	52.18±1.06d	51.78±1.43cd	51.8±1.05cd	51.57±1.06cd	51.02±1.36bc	50.62±1.52b	49.31±2.49a
	Parameter compared to control [%]	100±4	97±3	95±2	94±3	95±2	94±2	93±3	92±3	90±5
Amaranth	Relative Elasticity [%]	54.72±2.12f	52.57±1.55e	51.4±1.69d	50.45±1.52d	51.31±2.84d	48.88±1.91c	47.68±1.93b	47.04±1.63ab	46.39±1.45a
	Parameter compared to control [%]	100±4	96±3	94±3	92±3	94±6	89±4	87±4	86±3	85±3
Buckwheat	Relative Elasticity [%]	53.93±0.79f	53.12±0.9ef	52.11±1.11cd	51.87±0.99bcd	52.14±0.9d	51.46±1.03ab	51.45±1.22ab	51.31±1.15a	51.59±0.85abc
	Parameter compared to control [%]	100±15	114±10	108±12	102±13	112±24	132±13	167±11	173±18	180±13
Red sorghum	Baking loss [%]	11.07±2.13b	9.31±0.29a	9.08±0.93b	8.97±0.73a	9.29±0.69a	9.42±0.64a	8.77±0.11a	8.74±0.31a	9.06±0.8a
	Parameter compared to control [%]	100±19	84±3	82±10	81±8	84±7	85±7	79±1	79±4	82±9
White sorghum	Baking loss [%]	8.91±0.18a	8.83±0.51a	9.09±0.89abc	9.63±0.47d	9.52±0.31cd	9.36±0.23bcd	9.62±0.45d	9.44±0.5bcd	9.03±0.44ab
	Parameter compared to control [%]	100±2	99±6	102±10	108±5	107±3	105±2	108±5	106±5	101±5
Millet	Baking loss [%]	11.76±3.66a	11.78±3.67a	11.03±3.45a	11.14±3.47a	11.33±3.54a	11.46±3.57a	11.67±3.64a	11.26±3.51a	11.63±3.73a
	Parameter compared to control [%]	100±31	100±31	94±31	95±31	96±31	97±31	99±31	96±31	99±32
Amaranth	Baking loss [%]	11.81±2.9ab	11.5±2.86b	12.96±0.98a	12.76±0.64ab	13.09±0.51a	12.66±0.5ab	11.77±0.69ab	12.17±0.74ab	11.82±0.75ab
	Parameter compared to control [%]	100±25	97±25	110±8	108±5	111±4	107±4	100±6	103±6	100±6
Buckwheat	Baking loss [%]	10±0.6abc	10.3±0.36c	9.67±0.49a	10.2±0.65bc	9.91±0.3abc	9.8±0.62ab	9.95±0.62abc	10.04±0.29abc	9.77±0.5ab
	Parameter compared to control [%]	100±6	103±3	97±5	102±6	99±3	98±6	100±6	100±3	98±5

Different superscript letters denote significant differences within the same row (evaluated by the Fisher's Least Significant Difference test)

**Table S3.** Physical baking properties (Specific volume, volume yield, texture, baking loss) of the MWB including alternative cereal (red sorghum, white sorghum, millet, amaranth, buckwheat).

Addition [%]		0	5	10	15	20	25	30	35	40
Red sorghum	Specific volume [ml/g]	2.55±0.14bc	2.58±0.17bc	2.57±0.13bc	2.54±0.16bc	2.6±0.15bc	2.49±0.07b	2.33±0.13a	2.35±0.13a	2.29±0.13a
	Parameter compared to control [%]	100±5	101±7	101±5	100±6	102±6	98±3	91±6	92±6	90±6
White sorghum	Specific volume [ml/g]	2.83±0.08d	2.62±0.12c	2.56±0.16bc	2.48±0.14a	2.56±0.1bc	2.54±0.1ab	2.49±0.12ab	2.52±0.05ab	2.5±0.04ab
	Parameter compared to control [%]	100±3	93±5	90±6	88±6	90±4	90±4	88±5	89±2	88±2
Millet	Specific volume [ml/g]	2.29±0.2a	2.5±0.11c	2.6±0.15d	2.34±0.06ab	2.46±0.07c	2.43±0.27bc	2.41±0.08bc	2.35±0.13ab	2.31±0.19a
	Parameter compared to control [%]	100±9	109.17±4	113.54±6	102.18±3	107.42±3	106.11±11	105.24±3	102.62±6	100.87±8
Amaranth	Specific volume [ml/g]	2.23±0.15cde	2.4±0.05e	2.31±0.1de	2.28±0.08cde	2±0.37bc	2.07±0.26bcd	1.77±0.38ab	1.68±0.29a	1.63±0.34a
	Parameter compared to control [%]	100±7	107.62±2	103.59±4	102.24±4	89.69±19	92.83±13	79.37±21	75.34±17	73.09±21
Buckwheat	Specific volume [ml/g]	2.73±0.12def	2.66±0.13cd	2.79±0.22f	2.7±0.1de	2.77±0.1ef	2.62±0.1bc	2.67±0.11cd	2.58±0.07b	2.5±0.04a
	Parameter compared to control [%]	100±4	97.44±5	102.2±8	98.9±4	101.47±4	95.97±4	97.8±4	94.51±3	91.58±2
Red sorghum	Volume yield [ml/100g flour]	454.99±22.88bc	461.89±29.23bc	459.51±22.02bc	455.13±26.54bc	466.37±26.55c	446.16±13.31b	415.52±22.47a	419.99±24.69a	409.65±23.47a
	Parameter compared to control [%]	100±5	102±6	101±5	100±6	103±6	98±3	91±5	92±6	90±6
White sorghum	Volume yield [ml/100g flour]	505.14±14.94c	470.31±22.99ab	456.85±30.95a	458.38±14.03ab	472.86±30.6b	467.26±25.31ab	461.52±29.33ab	466.54±18.6ab	461.74±20.19ab
	Parameter compared to control [%]	100±3	93±5	90±7	91±3	94±6	93±5	91±6	92±4	91±4
Millet	Volume yield [ml/100g flour]	411.11±28.07ab	442.26±23.43d	461.11±27.45e	405.84±11.25a	431.98±8.12cd	424.41±46.31bc	424.34±15.74bc	412.33±24.06ab	405.18±35.12a
	Parameter compared to control [%]	100±7	107.58±5	112.16±6	98.72±3	105.08±2	103.24±11	103.22±4	100.3±6	98.56±9
Amaranth	Volume yield [ml/100g flour]	411.11±28.07bc	442.26±23.43d	461.11±27.45cd	405.84±11.25cd	431.98±8.12bc	424.41±46.31cd	424.34±15.74ab	412.33±24.06a	405.18±35.12a
	Parameter compared to control [%]	100±7	108±1	102±4	102±4	89±18	93±13	79±21	75±17	73±21
Buckwheat	Volume yield [ml/100g flour]	467.06±20.5def	455.74±24.12cd	477.02±37.51f	462.76±15.51de	471.55±14.91ef	448.97±15.1bc	458.34±14.28cd	442.64±8.07ab	431.53±6.97a
	Parameter compared to control [%]	100±4	98±5	102±8	99±3	101±3	96±3	95±2	92±2	92±2
Red sorghum	Crumb texture [N]	20.48±2.51cd	19.56±1.66bc	19.03±2.36bc	18.91±2.64b	16.39±3.23a	18.67±2.62b	22.14±3.77e	19.55±2.67bc	21.18±3.63de
	Parameter compared to control [%]	100±12	96±8	93±12	92±14	80±20	91±14	108±17	95±14	103±17
White sorghum	Crumb texture [N]	17±1.74ab	16±2.34a	18±3.53bc	18±2.87c	17±1.88ab	17±1.72bc	17±1.64ab	18±1.31c	18±1.5c
	Parameter compared to control [%]	100±10	95±14	103±20	109±16	100±11	102±10	100±10	108±7	107±8
Millet	Crumb texture [N]	25.45±5.76d	19.94±4.28ab	17.73±3.87a	20.85±4.55b	19.58±2.62ab	20.17±3.37ab	20.95±3.77b	22.15±6.53bc	24.58±9.35cd
	Parameter compared to control [%]	100±23	78.35±21	69.67±22	81.93±22	76.94±13	79.25±17	82.32±18	87.03±29	96.58±38
Amaranth	Crumb texture [N]	20.96±2.31ab	19.24±1.78a	23.89±3.88cd	22.77±4.41bcd	24.05±7.05cd	25.11±4.13de	23.93±3.71de	21.87±2.88abc	27.49±5.63e
	Parameter compared to control [%]	100±11	92±9	114±16	109±19	115±29	120±16	114±16	104±13	131±20
Buckwheat	Crumb texture [N]	17.14±3.55a	18.66±3.49abc	18.44±4.59abc	17.85±2.6ab	16.91±1.87a	19.77±2.42c	19.11±2.61bc	22.2±2.66d	24.47±5.03e
	Parameter compared to control [%]	100±21	109±19	108±25	104±15	99±11	115±12	111±14	130±12	143±21
Red sorghum	Relative Elasticity [%]	46.65±1.14d	46.16±1.21d	45.57±0.97c	45.01±1.3bc	44.88±1.08b	44.54±1.04ab	44.88±0.83b	44.31±0.89a	44.19±0.84a
	Parameter compared to control [%]	100±2	99±3	98±2	96±3	96±2	95±2	96±2	95±2	95±2
White sorghum	Relative Elasticity [%]	47.01±1.06f	45.31±1.07bcd	45.78±0.93de	45.6±0.84cde	45.84±0.82e	45.41±0.82bcde	45.01±0.86ab	45.17±0.71ab	44.62±0.83a
	Parameter compared to control [%]	100±2	96±2	97±2	97±2	98±2	97±2	96±2	96±2	95±2
Millet	Relative Elasticity [%]	42.37±3.98ab	43.06±1.15b	42.93±0.93b	42.62±1.1b	42.88±1.05b	43.02±0.96b	42.31±1ab	42.75±1.2ab	41.94±1.46a
	Parameter compared to control [%]	100±9	102±3	101±2	101±3	101±2	102±2	100±2	101±3	99±3
Amaranth	Relative Elasticity [%]	44.86±1.19c	44.41±0.97bc	44.15±1.06bc	44.27±0.89bc	41.07±2.61a	40.35±10.36a	42.25±1.49ab	42.03±1.67ab	41.48±2a
	Parameter compared to control [%]	100±3	99±2	98±2	99±2	92±6	90±26	94±4	94±4	92±5
Buckwheat	Relative Elasticity [%]	45.74±0.89cd	45.66±0.68cd	45.85±0.66d	45.95±0.72d	45.9±0.61d	45.42±0.77b	44.81±0.73b	44.46±0.76b	44.05±1.01a
	Parameter compared to control [%]	100±11	92±9	114±16	109±19	115±29	120±16	114±16	104±13	131±20
Red sorghum	Baking loss [%]	4.92±0.56b	4.61±0.5ab	4.62±0.26ab	4.52±0.33b	4.45±0.18a	4.67±0.3ab	4.76±0.41ab	4.62±0.3ab	4.67±0.27ab
	Parameter compared to control [%]	100±11	94±11	94±6	92±7	90±4	95±6	97±9	94±6	95±6
White sorghum	Baking loss [%]	4.85±0.39abc	4.54±0.26a	4.88±0.4bc	4.66±0.54ab	5.27±0.29d	5.1±0.22cd	4.89±0.38bc	5.04±0.37de	5.03±0.14cd
	Parameter compared to control [%]	100±8	94±6	101±8	96±12	109±6	105±4	101±8	104±7	104±3
Millet	Baking loss [%]	5.63±0.71a	5.57±1.05a	5.59±1.36a	7.58±0.51c	6.51±1.26ab	6.83±1.5cd	6.29±1.12ab	6.47±1.08ab	6.33±0.83ab
	Parameter compared to control [%]	100±13	99±19	99±24	135±7	116±19	121±22	112±18	115±17	112±13
Amaranth	Baking loss [%]	7.87±1.19ab	7.7±1.52a	9.14±0.25c	8.73±0.53bc	7.93±0.95ab	8.01±0.49ab	8.67±0.33bc	8.25±0.12abc	8.4±0.54abc
	Parameter compared to control [%]	100±15	98±20	116±3	111±6	101±12	102±6	110±4	105±1	107±6
Buckwheat	Baking loss [%]	8.74±0.75b	8.61±0.71b	8.73±0.32b	8.52±0.62ab	9.04±0.53b	8.56±0.6b	8.37±1.02ab	8.43±1.08ab	7.75±1.27a
	Parameter compared to control [%]	100±9	99±8	100±4	97±7	103±6	98±7	96±12	96±13	89±16

Different superscript letters denote significant differences within the same row (evaluated by the Fisher's Least Significant Difference test)

**Table S4.** SWB and MWB crumb colors (L\*a\*b\* values).

Parameter	Cereal	0%	5%	10%	15%	20%	25%	30	35	40
SWB - L* Crumb	Sorghum Armorik	70.97±8.38a	66.8±9.89bc	64.71±10.87bc	67.72±2.22ab	66.63±1.47bc	60.02±5.93ab	63.42±3.11cd	58.47±5.35e	57.46±5.83e
	Sorghum Ggolden	75.39±2.04a	73.78±1.63b	73.46±1.28b	71.72±1.42c	70.55±1.33ef	71.06±1.91cd	69.55±1.82fg	68.61±2.98g	68.6±3.06g
	Millet	75.08±2.3ab	75.17±2.38ab	76.01±2.5bc	74.78±3.21a	76.75±2.28c	75.08±1.73ab	76.08±1.47bc	76.58±1.63c	76.09±2.04c
	Amaranth	71.31±1.5a	68.12±1.36b	65.24±3.07c	64.24±0.92cd	63.82±0.93d	63.63±0.29d	60.07±1.38ef	61.11±0.67e	59.72±1.22f
	Buckwheat	76.61±4.03a	74.32±2.28b	72.18±2.9c	69.19±3.19d	69.18±2.07d	68.21±3.12d	65.75±3.08e	63.63±1.53f	62.49±1.82f
SWB - a* Crumb	Sorghum Armorik	6.71±6.1a	7.04±4.88ab	7.56±4.58ab	6.61±0.56a	7.14±0.68ab	8.78±1.6cd	8.49±0.9bcd	9.14±1.14cd	9.54±0.96d
	Sorghum Ggolden	3.88±0.39a	4.19±0.5ab	4.49±0.57bc	4.84±0.56cd	5.15±0.65d	5.57±0.73e	6.03±0.79f	6.4±1.01fg	6.64±0.99g
	Millet	3.99±0.92a	3.95±0.85ab	3.76±0.83abc	3.95±0.8ab	3.54±0.66c	3.51±0.73c	3.57±0.49bc	3.64±0.58abc	3.61±0.48abc
	Amaranth	5.01±0.85a	5.95±0.48b	6.16±0.34b	6.94±0.39c	7.66±0.55d	8.22±0.34e	8.85±0.75f	8.76±0.27f	9.12±0.43f
	Buckwheat	4.39±0.48ab	4.18±0.43ab	4.45±0.49b	4.78±0.57c	4.6±0.53bc	4.81±0.5c	5.1±0.47d	5.58±0.41e	5.56±0.4e
SWB - b* Crumb	Sorghum Armorik	23.17±4.83a	21.88±3.11bc	21.22±2bc	20.26±0.54cd	19.63±0.73d	19.92±0.96d	20.12±1.08ab	19.81±0.91d	20.2±0.75cd
	Sorghum Ggolden	21.63±0.81a	20.99±0.9b	20.9±0.81b	20.1±0.8c	19.78±0.65cd	19.82±0.82cd	19.55±0.75d	19.62±0.64d	19.48±0.62d
	Millet	20.37±1.09a	21.14±1.25b	21.26±1.16bc	21.38±0.99bc	21.66±1bcd	21.6±1.21bcd	21.89±0.93cd	22.19±1.25de	22.65±1.71e
	Amaranth	24.31±0.44a	25.33±0.54b	25.55±0.6b	25.97±0.36b	27.13±1.05c	27.45±1.58cd	28.14±1.05cd	27.72±1.33cd	27.66±1d
	Buckwheat	21.39±0.74a	20.19±0.86b	19.73±0.75c	18.92±1.02d	18.36±0.6e	18.1±0.79ef	17.72±1.13f	17±0.66g	16.53±0.45h
MWB - L* Crumb	Sorghum Armorik	80.34±1.3a	77.18±0.95b	74.37±1.46c	73.9±1.61c	71.5±1.56d	69.49±1.61e	67.71±1.1f	66.13±1.45g	65.5±1.53g
	Sorghum Ggolden	79.95±1.17a	78.29±1.48b	77.32±1.18c	75.37±1.72d	75.08±0.81d	73.7±1.28e	73.09±1.01e	71.4±1.55f	68.96±1.57g
	Millet	83.17±5.08bc	83.42±5.87bc	83.52±4.78c	81.34±1.79ab	82.8±3.9bc	84.26±3.96c	84.29±4.35c	80.18±2.86a	80.21±2.06a
	Amaranth	82.48±2.3f	81.23±2.18f	78.68±2.37e	75.37±2.29d	73.8±2.09bc	74.76±1.88cd	72.96±1.61b	72.47±0.98b	70.15±3.21a
	Buckwheat	80.5±2.35a	80.12±1.54a	79.13±2.44b	76.72±1.3c	75.01±1.57d	74.39±1.52de	73.71±1.01ef	72.92±1.04f	70.11±1.19g
MWB - a* Crumb	Sorghum Armorik	4.43±0.43a	4.97±0.57b	5.67±0.54c	6.16±0.64d	7±0.43e	7.59±0.6f	7.86±0.51fg	8.1±0.69g	8.56±0.59h
	Sorghum Ggolden	3.95±0.42a	4.35±0.56b	4.91±0.51c	5.23±0.5d	5.63±0.79e	5.82±0.64ef	6.07±0.61fg	6.24±0.63gh	6.43±0.52h
	Millet	3.79±0.88abc	3.8±0.89abc	4.03±0.72bcd	4.37±0.5d	3.67±0.85ab	3.76±0.78abc	3.46±0.98a	4.11±0.42cd	4.34±0.43d
	Amaranth	4.25±0.54a	4.54±0.42b	4.76±0.32bc	5.03±0.5c	5.55±0.37d	5.63±0.46d	5.97±0.46e	6.5±0.48f	6.87±0.4g
	Buckwheat	4.38±0.57a	4.34±0.5a	4.66±0.53b	4.67±0.49b	4.86±0.47bc	5.06±0.53c	5.42±0.47d	5.56±0.43de	5.71±0.54e
MWB - b* Crumb	Sorghum Armorik	26.42±0.7a	25.36±1.02b	24.95±0.7c	24.08±0.95d	23.69±0.69d	22.81±0.71e	22.59±0.46e	21.86±0.63f	22.01±0.62f
	Sorghum Ggolden	26.02±0.81a	25.76±0.36ab	25.45±0.58b	25±0.58c	24.64±0.71c	24.22±0.58d	23.44±0.42e	23.98±1.28d	22.79±0.68f
	Millet	25.7±1.13a	25.72±0.78a	27.05±0.84b	27.61±1.02b	27.28±1.51b	27.37±1.02b	27.63±1.38b	28.58±0.87c	29.48±1.33d
	Amaranth	25.27±0.72a	26.12±0.5b	26.01±0.45b	26.68±0.58c	27.17±0.63cd	26.85±0.95cd	26.45±0.71bc	27.46±0.59de	27.69±1.12e
	Buckwheat	25.55±0.74ab	25.68±0.78a	25.13±0.82bc	24.77±0.47cd	24.54±0.55d	24.35±0.42d	23.59±0.94e	23.41±0.99e	22.8±1.07f